=> fil req

STELLE PREGISTRY ENTERED AT 10:29:28 ON 26 MAR 2003 USE IS SUBJECT TO THE TERMS OF YOUR STN CUSTOMER AGREEMENT. PLEASE SEE "HELP USAGETERMS" FOR DETAILS. COPYRIGHT (C) 2003 American Chemical Society (ACS)

Property values tagged with IC are from the ZIC/VINITI data file provided by InfoChem.

HIGHEST RN 500688-79-9 STRUCTURE FILE UPDATES: 25 MAR 2003 HIGHEST RN 500688-79-9 DICTIONARY FILE UPDATES: 25 MAR 2003

TSCA INFORMATION NOW CURRENT THROUGH MAY 20, 2002

Please note that search-term pricing does apply when conducting SmartSELECT searches.

Crossover limits have been increased. See HELP CROSSOVER for details.

Experimental and calculated property data are now available. See HELP PROPERTIES for more information. See STNote 27, Searching Properties in the CAS Registry File, for complete details: http://www.cas.org/ONLINE/STN/STNOTES/stnotes27.pdf

ring nodes & bond => d stat que 111 L1

X—Hy-G1-N-02C2-G2-G3 3 5

full file search done on this structure X = any halogen Hy = heterocycle

REP G1=(1-2) CH2 VAR G2=CH/N VAR G3=NO2/CN NODE ATTRIBUTES:

NSPEC IS R ΑT NSPEC IS R AT

DEFAULT MLEVEL IS ATOM

GGCAT IS MCY UNS AT 2 3 heterocycle at node 2 is monocyclic, unsaturated, DEFAULT ECLEVEL IS LIMITED 3 heterocycle at node 2 is monocyclic, unsaturated, with at least 1 nitrogen.

**GRAPH ATTRIBUTES:** 

RING(S) ARE ISOLATED OR EMBEDDED NUMBER OF NODES IS

STEREO ATTRIBUTES: NONE

1296 SEA FILE=REGISTRY SSS FUL L1 L3

L9

CH~NO2

Subsit search done on this structure ( alaim 11)

NODE ATTRIBUTES: DEFAULT MLEVEL IS ATOM DEFAULT ECLEVEL IS LIMITED

GRAPH ATTRIBUTES: RING(S) ARE ISOLATED OR EMBEDDED NUMBER OF NODES IS 16

STEREO ATTRIBUTES: NONE

22 SEA FILE=REGISTRY SUB=L3 SSS FUL L9

100.0% PROCESSED 125 ITERATIONS

322 ANSWERS

SEARCH TIME: 00.00.01

=> fil hcapl; d que nos 122

FILE 'HCAPLUS' ENTERED AT 10:29:29 ON 26 MAR 2003 USE IS SUBJECT TO THE TERMS OF YOUR STN CUSTOMER AGREEMENT. PLEASE SEE "HELP USAGETERMS" FOR DETAILS. COPYRIGHT (C) 2003 AMERICAN CHEMICAL SOCIETY (ACS)

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FILE COVERS 1907 - 26 Mar 2003 VOL 138 ISS 13 FILE LAST UPDATED: 25 Mar 2003 (20030325/ED)

This file contains CAS Registry Numbers for easy and accurate substance identification.

| L1         |      | TR          |               |                                      |
|------------|------|-------------|---------------|--------------------------------------|
| L3         | 1296 | SEA FILE=RE | GISTRY SSS F  | JL L1                                |
| L9         |      | STR         |               |                                      |
| <b>Ե11</b> | 22   | SEA FILE=RE | GISTRY SUB=L  | 3 SSS FUL L9                         |
| L14        |      |             | APLUS ABB=ON  | L11                                  |
| L15        | 377  | SEA FILE=HC | APLUS ABB=ON  | SIPHONAPTERA+NT/CT                   |
| L16        | 17   | SEA FILE=HC | APLUS ABB=ON  | ANOPLURA?                            |
| L17        | 3183 | SEA FILE=HC | APLUS ABB=ON  | FLEA# OR LICE OR LOUSE               |
| L20        | 3258 | SEA FILE=HC | APLUS ABB=ON  | PARASITICIDES+OLD/CT                 |
| L21        | 1193 | SEA FILE=HC | APLUS ABB=ON  | ECTOPARASIT? OR PARASIT?(L)ECTO/OBI  |
| L22        | 3    | SEA FILE=HC | CAPLUS ABB=ON | L14 AND ((L15 OR L16 OR L17) OR (L20 |
| are and    |      | R L21))     |               |                                      |

=> fil uspatf; d que nos 131

FILE 'USPATFULL' ENTERED AT 10:29:29 ON 26 MAR 2003
CA INDEXING COPYRIGHT (C) 2003 AMERICAN CHEMICAL SOCIETY (ACS)

FILE COVERS 1971 TO PATENT PUBLICATION DATE: 25 Mar 2003 (20030325/PD) FILE LAST UPDATED: 25 Mar 2003 (20030325/ED)

HIGHEST GRANTED PATENT NUMBER: US6539548

HIGHEST APPLICATION PUBLICATION NUMBER: US2003056270

CA INDEXING IS CURRENT THROUGH 25 Mar 2003 (20030325/UPCA) ISSUE CLASS FIELDS (/INCL) CURRENT THROUGH: 25 Mar 2003 (20030325/PD) REVISED CLASS FIELDS (/NCL) LAST RELOADED: Dec 2002 USPTO MANUAL OF CLASSIFICATIONS THESAURUS ISSUE DATE: Dec 2002

```
USPAT2 is now available. USPATFULL contains full text of the
                                                                           <<<
>>>
     original, i.e., the earliest published granted patents or
                                                                           <<<
ンン>
    applications. USPAT2 contains full text of the latest US publications, starting in 2001, for the inventions covered in
                                                                            <<<
>>>
                                                                            <<<
>>>
     USPATFULL. A USPATFULL record contains not only the original
                                                                            <<<
>>>
                                                                            <<<
     published document but also a list of any subsequent
>>>
     publications. The publication number, patent kind code, and
                                                                            <<<
     publication date for all the US publications for an invention
                                                                            <<<
    are displayed in the PI (Patent Information) field of USPATFULL
                                                                            <<<
    records and may be searched in standard search fields, e.g., /PN, <<<
>>>
                                                                            <<<
     /PK, etc.
>>>
                                                                            <<<
     USPATFULL and USPAT2 can be accessed and searched together
>>>
     through the new cluster USPATALL. Type FILE USPATALL to
                                                                            <<<
>>>
                                                                            <<<
     enter this cluster.
>>>
                                                                            <<<
>>>
                                                                            <<<
    Use USPATALL when searching terms such as patent assignees,
>>>
>>> classifications, or claims, that may potentially change from
                                                                            <<<
                                                                            <<<
    the earliest to the latest publication.
>>>
```

This file contains CAS Registry Numbers for easy and accurate substance identification.

```
L1
                STR
           1296 SEA FILE=REGISTRY SSS FUL L1
L3
L9
                STR
             22 SEA FILE=REGISTRY SUB=L3 SSS FUL L9
L11
             22 SEA FILE=USPATFULL ABB=ON
                                            L11
L24
                                             (FLEA# OR LICE OR LOUSE)/IT, TI, AB, CL
            580 SEA FILE-USPATFULL ABB-ON
L25
           1185 SEA FILE=USPATFULL ABB=ON
                                             (PARASITICID? OR PARACITICID?)/IT,TI
L26
                 , AB, CLM
            498 SEA FILE=USPATFULL ABB=ON
                                             (ECTOPARASIT? OR PARASIT? (L) ECTO) / IT
L27
                 ,TI,AB,CLM
               8 SEA FILE=USPATFULL ABB=ON
                                             ANOPLURA?/IT, TI, AB, CLM
L28
             84 SEA FILE=USPATFULL ABB=ON
                                             SIPHONAPTERA?/IT, TI, AB, CLM
L29
             52 SEA FILE=USPATFULL ABB=ON
                                             CTENOCEPHALIDE?/IT, TI, AB, CLM
L30
               7 SEA FILE-USPATFULL ABB-ON L24 AND (L25 OR L26 OR L27 OR L28
L31
                 OR L29 OR L30)
```

=> fil biosis; d que nos 147

FILE 'BIOSIS' ENTERED AT 10:29:30 ON 26 MAR 2003 COPYRIGHT (C) 2003 BIOLOGICAL ABSTRACTS INC.(R)

FILE COVERS 1969 TO DATE.
CAS REGISTRY NUMBERS AND CHEMICAL NAMES (CNs) PRESENT FROM JANUARY 1969 TO DATE.

RECORDS LAST ADDED: 19 March 2003 (20030319/ED)

```
L1 STR
L3 1296 SEA FILE=REGISTRY SSS FUL L1
L9 STR
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L11 22 SEA FILE=REGISTRY SUB=L3 SSS FUL L9 L47 0 SEA FILE=BIOSIS ABB=ON L11

=> fil vetu; d que nos 159

FILE 'VETU' ENTERED AT 10:29:31 ON 26 MAR 2003 COPYRIGHT (C) 2003 THOMSON DERWENT

FILE LAST UPDATED: 02 JAN 2002 <20020102/UP>
FILE COVERS 1983-2001

L1 STR
L3 1296 SEA FILE=REGISTRY SSS FUL L1
L9 STR
L11 22 SEA FILE=REGISTRY SUB=L3 SSS FUL L9
L59 0 SEA FILE=VETU ABB=ON L11

=> fil agricola; d que nos 158

FILE 'AGRICOLA' ENTERED AT 10:29:32 ON 26 MAR 2003

FILE COVERS 1970 TO 19 Feb 2003 (20030219/ED)

Compiled and distributed by the National Agricultural Library of the Department of Agriculture of the United States of America. It contains copyrighted material. All rights reserved. (2002)

This file contains CAS Registry Numbers for easy and accurate substance identification.

L1 STR
L3 1296 SEA FILE=REGISTRY SSS FUL L1
L9 STR
L11 22 SEA FILE=REGISTRY SUB=L3 SSS FUL L9
L58 0 SEA FILE=AGRICOLA ABB=ON L11

=> dup rem 122,131

FILE 'HCAPLUS' ENTERED AT 10:29:33 ON 26 MAR 2003 USE IS SUBJECT TO THE TERMS OF YOUR STN CUSTOMER AGREEMENT. PLEASE SEE "HELP USAGETERMS" FOR DETAILS. COPYRIGHT (C) 2003 AMERICAN CHEMICAL SOCIETY (ACS)

FILE 'USPATFULL' ENTERED AT 10:29:33 ON 26 MAR 2003
CA INDEXING COPYRIGHT (C) 2003 AMERICAN CHEMICAL SOCIETY (ACS)
PROCESSING COMPLETED FOR L22
PROCESSING COMPLETED FOR L31

10 DUP REM L22 L31 (0 DUPLICATES REMOVED)

ANSWERS '1-3' FROM FILE HCAPLUS

ANSWERS '4-10' FROM FILE USPATFULL

=> d ibib abs hitstr 1-10 \*

L60 ANSWER 1 OF 10 HCAPLUS COPYRIGHT 2003 ACS ACCESSION NUMBER: 1999:549118 HCAPLUS DOCUMENT NUMBER: 131:181124

```
TITLE:
```

Aqueous formulations for combating parasitic insects

and acarina on humans

INVENTOR(S):

Sirinyan, Kirkor; Horn, Karin; Stocker, Ronald Helmut;

Sonneck, Rainer

CODEN: PIXXD2

PATENT ASSIGNEE(S):

Bayer Aktiengesellschaft, Germany

SOURCE:

PCT Int. Appl., 45 pp.

DOCUMENT TYPE:

Patent

LANGUAGE:

German

ETND

FAMILY ACC. NUM. COUNT:

PATENT INFORMATION: DAMENIA NO

| WO 9941987 A1 19990826 WO 1999-EP878 19990210 W: AL, AM, AT, AU, AZ, BA, BB, BG, BR, BY, CA, CH, CN, CU, CZ DK, EE, ES, FI, GB, GD, GE, GH, GM, HR, HU, ID, IL, IN, IS KE, KG, KP, KR, KZ, LC, LK, LR, LS, LT, LU, LV, MD, MG, MK MW, MX, NO, NZ, PL, PT, RO, RU, SD, SE, SG, SI, SK, SL, TJ | JP,<br>MN,<br>TM,<br>RU, |
|--|--------------------------|
| DK, EE, ES, FI, GB, GD, GE, GH, GM, HR, HU, ID, IL, IN, IS<br>KE, KG, KP, KR, KZ, LC, LK, LR, LS, LT, LU, LV, MD, MG, MK   | JP,<br>MN,<br>TM,<br>RU, |
| DK, EE, ES, FI, GB, GD, GE, GH, GM, HR, HU, ID, IL, IN, IS<br>KE, KG, KP, KR, KZ, LC, LK, LR, LS, LT, LU, LV, MD, MG, MK   | JP,<br>MN,<br>TM,<br>RU, |
| KE, KG, KP, KR, KZ, LC, LK, LR, LS, LT, LU, LV, MD, MG, MK   | MN,<br>TM,<br>RU,        |
| MW. MX. NO. NZ. PI., PT. RO. RII SD. SE. SG. ST. SK. ST. T.T.  | TM,<br>RU,<br>ES,        |
| 1111/ 121/ 110/ 112/ 22/ 21/ 110/ 110/ 1   | RU,                      |
| TR, TT, UA, UG, US, UZ, VN, YU, ZW, AM, AZ, BY, KG, KZ, MD   | ES,                      |
| TJ, TM   | ES,                      |
| RW: GH, GM, KE, LS, MW, SD, SZ, UG, ZW, AT, BE, CH, CY, DE, DK   |                          |
| FI, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE, BF, BJ, CF, CG   | CI,                      |
| CM, GA, GN, GW, ML, MR, NE, SN, TD, TG   | •                        |
| DE 19807630 A1 19990826 DE 1998-19807630 19980223  |                          |
| CA 2321206 AA 19990826 CA 1999-2321206 19990210  |                          |
| AU 9925230 Al 19990906 AU 1999-25230 19990210  |                          |
| AU 739980 B2 20011025  |                          |
| BR 9908197 A 20001024 BR 1999-8197 19990210  |                          |
| EP 1056342 A1 20001206 EP 1999-904877 19990210   |                          |
| R: AT, BE, CH, DE, DK, ES, FR, GB, GR, IT, LI, LU, NL, SE, MC,   | PT,                      |
| IE, FI   | -                        |
| JP 2002503682 T2 20020205 JP 2000-532014 19990210  |                          |
| ZA 9901384 A 19990823 ZA 1999-1384 1.9990222   |                          |
| US 6369054 B1 20020409 US 2000-601572 20000803   |                          |
| PRIORITY APPLN. INFO.: DE 1998-19807630 A 19980223   |                          |
| WO 1999-EP878 W 19990210   |                          |

## OTHER SOURCE(S):

MARPAT 131:181124 The invention relates to aq. formulations for combating parasitic insects AB and acarina on the skin of human beings, having the following compn.: agonists or antagonists of nicotinic acetylcholine receptors of insects, such as imidacloprid, at 0.0001-7.5 wt. %; water, at 20-50 wt. %; acyclic alcs., at 20-50 wt. %; solvents from the group of cyclic carbonates or lactones, .5-20.0 wt. %; and, optionally, other adjuvants from the group of thickening agents, antioxidants, expanding agents, preserving agents, deposit builders and emulsifiers, at .gtoreq.30 wt. %.

IT 101336-64-5

> RL: BUU (Biological use, unclassified); THU (Therapeutic use); BIOL (Biological study); USES (Uses)

(aq. ectoparasiticidal formulation for humans)

RN 101336-64-5 HCAPLUS

CN Pyrimidine, 1-[(6-chloro-3-pyridinyl)methyl]hexahydro-2-(nitromethylene)-(9CI) (CA INDEX NAME)

REFERENCE COUNT:

THERE ARE 4 CITED REFERENCES AVAILABLE FOR THIS

## RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

```
L60 ANSWER 2 OF 10 HCAPLUS COPYRIGHT 2003 ACS
ACCESSION NUMBER:
                        1999:549117 HCAPLUS
```

DOCUMENT NUMBER:

131:166526

TITLE:

Aqueous formulations of animal

ectoparasiticides

INVENTOR(S):

Sirinyan, Kirkor; Dorn, Hubert; Heukamp, Ulrich

Bayer Aktiengesellschaft, Germany PATENT ASSIGNEE(S):

SOURCE:

PCT Int. Appl., 48 pp.

DOCUMENT TYPE:

CODEN: PIXXD2

Patent

LANGUAGE:

German

FAMILY ACC. NUM. COUNT:

PATENT INFORMATION:

```
PATENT NO.
                            DATE
                                           APPLICATION NO.
                                                            DATE
                     KIND
                                           _____
    WO 9941986
                      A1
                            19990826
                                           WO 1999-EP875
                                                            19990210
        W: AL, AM, AT, AU, AZ, BA, BB, BG, BR, BY, CA, CH, CN, CU, CZ, DE,
            DK, EE, ES, FI, GB, GD, GE, GH, GM, HR, HU, ID, IL, IN, IS, JP,
            KE, KG, KP, KR, KZ, LC, LK, LR, LS, LT, LU, LV, MD, MG, MK, MN,
            MW, MX, NO, NZ, PL, PT, RO, RU, SD, SE, SG, SI, SK, SL, TJ,
            TR, TT, UA, UG, US, UZ, VN, YU, ZW, AM, AZ, BY, KG, KZ, MD, RU,
            TJ, TM
        RW: GH, GM, KE, LS, MW, SD, SZ, UG, ZW, AT, BE, CH, CY, DE, DK, ES,
             FI, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE, BF, BJ, CF, CG, CI,
             CM, GA, GN, GW, ML, MR, NE, SN, TD, TG
                            19990826
                                           DE 1998-19807633 19980223
    DE 19807633
                      A1
                                           CA 1999-2321209 19990210
                            19990826
    CA 2321209
                       AA
                            19990906
                                           AU 1999-26230
                                                            19990210
    AU 9926230
                       A1
    AU 750954
                       B2
                            20020801
    BR 9908173
                       Α
                            20001031
                                           BR 1999-8173
                                                             19990210
                                           EP 1999-906223
                                                            19990210
    EP 1056343
                      A1
                            20001206
            AT, BE, CH, DE, DK, ES, FR, GB, GR, IT, LI, NL, SE, PT, IE, SI,
             LT, LV, FI, RO
    JP 2002503681
                       T2
                            20020205
                                           JP 2000-532013
                                                            19990210
    EE 200000485
                            20020215
                                           EE 2000-20000048519990210
                       Α
    NZ 506460
                            20030131
                                           NZ 1999-506460
                                                            19990210
                       Α
    ZA 9901385
                            19990823
                                           ZA 1999-1385
                                                             19990222
                       Α
                            20001023
    NO 2000004188
                                           NO 2000-4188
                                                             20000822
                      Α
PRIORITY APPLN. INFO.:
                                        DE 1998-19807633 A
                                                            19980223
```

MARPAT 131:166526 OTHER SOURCE(S):

The invention relates to aq. formulations for combating parasitic insects AB and acarina on the skin of animals, having the following compn.: (a) agonists or antagonists of nicotinic acetylcholine receptors of insects, at 1-20 wt. %; (b) water, at 2.5-15 wt. %; (c) solvents from the group of alcs., such as benzyl alc., tetrahydrofurfuryl alc. or optionally-substituted pyrrolidone, at .gtoreq.20 wt. %; (d) solvents from the group of the cyclic carbonates or lactones. at 5-50.0 wt. %; (e) optionally, other adjuvants from the group of the thickening agents, spreading agents, colorants, antioxidants, expanding agents, preserving agents, deposit builders and emulsifiers, at 0.025-10 wt. %.

IT 101336-64-5

RL: BUU (Biological use, unclassified); BIOL (Biological study); USES

(in aq. formulations of animal ectoparasiticides)

RN 101336-64-5 HCAPLUS

Pyrimidine, 1-[(6-chloro-3-pyridinyl)methyl]hexahydro-2-(nitromethylene)-CN (9CI) (CA INDEX NAME)

WO 1999-EP875

W

19990210

jullar

$$\begin{array}{c|c} H & CH-NO_2 & N & C1 \\ \hline N & CH_2 & \end{array}$$

REFERENCE COUNT:

THERE ARE 4 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

L60 ANSWER 3 OF 10 HCAPLUS COPYRIGHT 2003 ACS ACCESSION NUMBER: 1996:30055 HCAPLUS

4

DOCUMENT NUMBER:

124:79467

TITLE:

Nonsystemic ectoparasiticides.

INVENTOR(S): PATENT ASSIGNEE(S):

Dorn, Hubert; Hopkins, Terence Bayer A.-G., Germany

SOURCE:

Eur. Pat. Appl., 33 pp.

CODEN: EPXXDW

DOCUMENT TYPE:

Patent

LANGUAGE:

German 1

FAMILY ACC. NUM. COUNT:

PATENT INFORMATION:

| PATENT NO.  | KIND DATE   | APPI TCAMTON  |
|---|---|---|
| EP 682869   | 7.1   | APPLICATION NO. DATE  |
|   | A1 19951123<br>AA 19951121<br>A1 19991028<br>A 19951121<br>A1 19951130<br>B2 19980917 | EP 1995-106925 19950508<br>FR, GB, GR, IE, IT, LI, NL, PT, SE<br>DE 1994-4417742 19940520<br>CA 1995-2149594 19950517<br>IL 1995-113756 19950517<br>FI 1995-2421 19950518<br>AU 1995-20144 19950518 |
| ZA 9504107<br>HU 71902<br>HU 220131<br>JP 08092091        | A 19951121<br>A 19960119<br>A2 19960228<br>B 20011128<br>A2 19960409                  | NO 1995-1993 19950519<br>ZA 1995-4107 19950519<br>HU 1995-1483 19950519   |
| JP 3276808<br>RU 2166253                                  | B2 20020422<br>C2 20010510  | JP 1995-144251 19950519   |
| JP 2002201131<br>CZ 291031<br>US 6232328<br>US 2001021716 | A2 20020716<br>B6 20021211<br>B1 20010515   | RU 1995-107893 19950519<br>JP 2001-386054 19950519<br>CZ 1995-1309 19950519   |
| US 6429206<br>US 2001027201                               | A1 20010913<br>B2 20020806<br>A1 20011004   | US 2001-781108 20010209   |
| US 2001044456   | A1 20011115<br>B2 20021217<br>A1 20011122   | US 2001-780646 20010209<br>US 2001-780918 20010209  |
| DS 6329374 PRIORITY APPLN: INFO::                         | B1 20011211   | US 2001-780783 20010209<br>US 2001-781028 20010209<br>DE 1994-4417742 A 19940530  |
| OTHER SOURCE(S): AB Agonists and                          | MARPAT 124:7946   | JP 1995-144251 B1 19950512 US 1897-2222 A3 19950519   |

OTHER SOURCE(S): MARPAT 124:79467 AΒ

Agonists and antagonists of nicotinergic acetylcholine receptors (Markush A3 19970908 given), such as imidacloprid, are nonsystemic ectoparasiticides for humans and animals, suitable for the control of fleas, IT

101336-64-5

RL: BUU (Biological use, unclassified); THU (Therapeutic use); BIOL (nonsystemic ectoparasiticide)

RN 101336-64-5 HCAPLUS

Pyrimidine, 1-[(6-chloro-3-pyridinyl)methyl]hexahydro-2-(nitromethylene)-(9CI) (CA INDEX NAME)

L60 ANSWER 4 OF 10 USPATFULL

ACCESSION NUMBER:

2002:75429 USPATFULL

TITLE:

CN

Aqueous agents for combating parasitic insects and

acarina in human beings

INVENTOR(S):

Sirinyan, Kirkor, Gladbach, GERMANY, FEDERAL REPUBLIC

OF

Horn, Karin, Solingen, GERMANY, FEDERAL REPUBLIC OF Stocker, Ronald Helmut, Monheim, GERMANY, FEDERAL

REPUBLIC OF

Sonneck, Rainer, Leverkusen, GERMANY, FEDERAL REPUBLIC

of

PATENT ASSIGNEE(S):

Bayer AG, Leverkusen, GERMANY, FEDERAL REPUBLIC OF

(non-U.S. corporation)

|                     | NUMBER                          | KIND | DATE                             |                     |
|---------------------|---------------------------------|------|----------------------------------|---------------------|
| PATENT INFORMATION: | US 6369054<br>WO 9941987        | B1   | 20020409<br>19990826             |                     |
| APPLICATION INFO.:  | US 2000-601572<br>WO 1999-EP878 |      | 20000803<br>19990210<br>20000803 | (9)<br>PCT 371 date |

NUMBER DATE

PRIORITY INFORMATION:

DE 1998-19807630 19980223

DOCUMENT TYPE:

Utility

FILE SEGMENT:

GRANTED

PRIMARY EXAMINER:

Pryor, Alton

NUMBER OF CLAIMS:

14

EXEMPLARY CLAIM:

1

NUMBER OF DRAWINGS:

0 Drawing Figure(s); 0 Drawing Page(s)

LINE COUNT:

585

CAS INDEXING IS AVAILABLE FOR THIS PATENT.

AB The present invention relates to water-containing formulations for the dermal control of parasitic insects and mites on humans, said formulations having the following composition:

a--agonists or antagonists of the nicotinic acetylcholine receptors of insects in a concentration of from 0.0001 to 7.5% by weight, based on the overall weight of the formulation;

b--water in a concentration of from 20 to 50% by weight, based on the overall weight of the formulation;

c--acyclic alcohols in a concentration of from 20 to 50% by weight, based on the overall weight of the formulation;

d--solvents from the group consisting of cyclic carbonates and lactones in a concentration of from  $2.5~\mathrm{up}$  to 20.0% by weight, based on the overall weight of the formulation;

Searched by Barb O'Bryen, STIC 308-4291

e--optionally further auxiliaries from the group consisting of thickeners, spreading agents, colorants, antioxidants, propellants, preservatives, tackifiers, emulsifiers, in a concentration of from 0 up to 30% by weight, based on the overall weight of the formulation.

CAS INDEXING IS AVAILABLE FOR THIS PATENT.

IT 101336-64-5

(aq. ectoparasiticidal formulation for humans)

RN 101336-64-5 USPATFULL

Pyrimidine, 1-[(6-chloro-3-pyridinyl)methyl]hexahydro-2-(nitromethylene)-CN (CA INDEX NAME)

L60 ANSWER 5 OF 10 USPATFULL

ACCESSION NUMBER:

2001:212459 USPATFULL

TITLE:

Non-systemic control of parasites

INVENTOR(S):

Dorn, Hubert, Wuppertal, Germany, Federal Republic of

Hopkins, Terence, Tamborine, Australia

|                       | NUMBER           | KIND   | DATE         |
|-----------------------|------------------|--------|--------------|
|                       |                  |        | <del></del>  |
| PATENT INFORMATION:   | US 2001044456    | A1     | 20011122     |
| APPLICATION INFO.:    | US 2001-780783   | A1     | 20010209 (9) |
| RELATED APPLN. INFO.: | Division of Ser. | No. US | 1997-925372, |

filed on 8 Sep 1997, GRANTED, Pat. No. US 6232328 Continuation of Ser. No. US 1995-440428, filed on 12 May 1995, ABANDONED

|    | NUMBER       | DATE     |
|----|--------------|----------|
|    |              |          |
| DE | 1994-4417742 | 19940520 |

PRIORITY INFORMATION: DOCUMENT TYPE:

DE 1994-441/742

Utility

FILE SEGMENT:

APPLICATION

LEGAL REPRESENTATIVE:

Kurt G. Briscoe, Esq., Norris McLaughlin & Marcus,

P.A., 220 East 42nd Street - 30th Floor, New York, NY, 10017

NUMBER OF CLAIMS:

EXEMPLARY CLAIM:

1

LINE COUNT:

1302

CAS INDEXING IS AVAILABLE FOR THIS PATENT.

Use of agonists and antagonists of the nicotinergic acetylcholine receptors of insects for the non-systernic control of parasitic insects, such as fleas, lice and flies, on humans and on

animals.

CAS INDEXING IS AVAILABLE FOR THIS PATENT.

101336-64-5

(nonsystemic ectoparasiticide)

101336-64-5 USPATFULL RN

CN Pyrimidine, 1-[(6-chloro-3-pyridinyl)methyl]hexahydro-2-(nitromethylene)-(9CI) (CA INDEX NAME)

$$\begin{array}{c|c} H & \text{CH-NO}_2 & \text{N} \\ \hline N & \text{CH}_2 & \end{array}$$

L60 ANSWER 6 OF 10 USPATFULL

ACCESSION NUMBER:

2001:205930 USPATFULL

TITLE:

Non-systemic control of parasites

INVENTOR(S):

Dorn, Hubert, Wuppertal, Germany, Federal Republic of

Hopkins, Terence, Tamborine, Australia

NUMBER KIND DATE -----PATENT INFORMATION: US 2001041723 A1 20011115 US 6495573 В2 20021217 APPLICATION INFO.: US 2001-780918 A1 20010209 (9) .

RELATED APPLN. INFO.:

Division of Ser. No. US 1997-925372, filed on 8 Sep 1997, GRANTED, Pat. No. US 6232328 Continuation of Ser.

No. US 1995-440428, filed on 12 May 1995, ABANDONED

NUMBER DATE

PRIORITY INFORMATION:

DE 1994-4417742

19940520

DOCUMENT TYPE: FILE SEGMENT:

Utility APPLICATION

LEGAL REPRESENTATIVE:

Kurt G. Briscoe, Esq., Norris McLaughlin & Marcus, P.A., 220 East 42nd Street - 30th Floor, New York, NY,

NUMBER OF CLAIMS:

EXEMPLARY CLAIM:

LINE COUNT:

1305

CAS INDEXING IS AVAILABLE FOR THIS PATENT.

Use of agonists and antagonists of the nicotinergic acetylcholine receptors of insects for the non-systemic control of parasitic insects, such as fleas, lice and flies, on humans and on

animals.

CAS INDEXING IS AVAILABLE FOR THIS PATENT.

101336-64-5

(nonsystemic ectoparasiticide)

RN 101336-64-5 USPATFULL

Pyrimidine, 1-[(6-chloro-3-pyridinyl)methyl]hexahydro-2-(nitromethylene)-CN (CA INDEX NAME)

L60 ANSWER 7 OF 10 USPATFULL

ACCESSION NUMBER:

2001:171151 USPATFULL

TITLE:

Non-systemic control of parasites

INVENTOR(S):

Dorn, Hubert, Wuppertal, DE, United States Hopkins, Terence, Tamborine, Australia

Searched by Barb O'Bryen, STIC 308-4291.

(9)

|                     | NUMBER          | KIND    | DATE      |
|---------------------|-----------------|---------|-----------|
|                     |                 |         |           |
| PATENT INFORMATION: | US 2001027201   | A1      | 20011004  |
| APPLICATION INFO.:  | US 2001-780646  | A1      | 20010209  |
| DELABED ADDIN THEO. | Division of Con | NI- IIC | 1007 0252 |

RELATED APPLN. INFO.: Division of Ser. No. US 1997-925372, filed on 8 Sep 1997, GRANTED, Pat. No. US 6232328 Continuation of Ser. No. US 1995-440428, filed on 12 May 1995, ABANDONED

DOCUMENT TYPE: Utility
FILE SEGMENT: APPLICATION

LEGAL REPRESENTATIVE: Kurt G. Briscoe, Esq., Norris McLaughlin & Marcus,

P.A., 30th Floor, 220 East 42nd Street, New York, NY,

10017

NUMBER OF CLAIMS: 9
EXEMPLARY CLAIM: 1
LINE COUNT: 1286

CAS INDEXING IS AVAILABLE FOR THIS PATENT.

Use of agonists and antagonists of the nicotinergic acetylcholine receptors of insects for the non-systemic control of parasitic insects, such as **fleas**, **lice** and flies, on humans and on animals.

CAS INDEXING IS AVAILABLE FOR THIS PATENT.

IT 101336-64-5

(nonsystemic ectoparasiticide)

RN 101336-64-5 USPATFULL

CN Pyrimidine, 1-[(6-chloro-3-pyridinyl)methyl]hexahydro-2-(nitromethylene)-(9CI) (CA INDEX NAME)

L60 ANSWER 8 OF 10 USPATFULL

ACCESSION NUMBER: 2001:155782 USPATFULL

TITLE: Non-systemic control of parasites

INVENTOR(S): Dorn, Hubert, Wuppertal, Germany, Federal Republic of

Hopkins, Terence, Tamborine, Australia

No. US 1995-440428, filed on 12 May 1995, ABANDONED

NUMBER DATE

PRIORITY INFORMATION: DE 1994-4417742 19940520 DOCUMENT TYPE: Utility

DOCUMENT TYPE: Utility
FILE SEGMENT: APPLICATION

LEGAL REPRESENTATIVE: Kurt G. Briscoe, Esq., Norris McLaughlin & Marcus, P.A., 30th Floor, 220 East 42nd Street, New York, NY,

09/720646

10017

NUMBER OF CLAIMS:

14

EXEMPLARY CLAIM:

1

LINE COUNT:

1347

CAS INDEXING IS AVAILABLE FOR THIS PATENT.

AB

Use of agonists and antagonists of the nicotinergic acetylcholine receptors of insects for the non-systemic control of parasitic insects, such as fleas, lice and flies, on humans and on

animals.

CAS INDEXING IS AVAILABLE FOR THIS PATENT.

101336-64-5

(nonsystemic ectoparasiticide)

RN 101336-64-5 USPATFULL

CN Pyrimidine, 1-[(6-chloro-3-pyridinyl)methyl]hexahydro-2-(nitromethylene)-(9CI) (CA INDEX NAME)

L60 ANSWER 9 OF 10 USPATFULL

ACCESSION NUMBER:

2001:226631 USPATFULL

TITLE:

Non-systemic control of parasites

INVENTOR(S):

Dorn, Hubert, Wuppertal, Germany, Federal Republic of

Hopkins, Terence, Qld., Australia

PATENT ASSIGNEE(S):

Bayer Aktiengesellschaft, Leverkusen, Germany, Federal

Republic of (non-U.S. corporation)

|                       | NUMBER           | KIND  | DATE        |
|-----------------------|------------------|-------|-------------|
|                       |                  |       |             |
| PATENT INFORMATION:   | US 6329374       | B1    | 20011211    |
| APPLICATION INFO.:    | US 2001-781028   |       | 20010209 (9 |
| RELATED APPLN. INFO.: | Division of Ser. | No US | 1997-925372 |

vision of Ser. No. US 1997-925372, filed on 8 Sep 1997, now patented, Pat. No. US 6232328 Continuation of

Ser. No. US 1995-440428, filed on 12 May 1995, now

abandoned

NUMBER DATE DE 1994-4417742 19940520

PRIORITY INFORMATION: DOCUMENT TYPE:

Utility

FILE SEGMENT:

GRANTED

PRIMARY EXAMINER:

Robinson, Allen J.

LEGAL REPRESENTATIVE:

Norris McLaughlin & Marcus

NUMBER OF CLAIMS:

EXEMPLARY CLAIM:

1

LINE COUNT:

1243

CAS INDEXING IS AVAILABLE FOR THIS PATENT.

Use of agonists and antagonists of the nicotinergic acetylcholine receptors of insects for the non-systemic control of parasitic insects,

such as fleas, lice and flies, on humans and on

animals.

CAS INDEXING IS AVAILABLE FOR THIS PATENT.

101336-64-5

(nonsystemic ectoparasiticide)

101336-64-5 USPATFULL RN

Pyrimidine, 1-[(6-chloro-3-pyridinyl)methyl]hexahydro-2-(nitromethylene)-CN (CA INDEX NAME)

USPATFULL L60 ANSWER 10 OF 10

ACCESSION NUMBER:

2001:71563 USPATFULL

TITLE:

Non-systemic control of parasites

INVENTOR(S):

Dorn, Hubert, Wuppertal, Germany, Federal Republic of

Hopkins, Terence, Tamborine, Australia

PATENT ASSIGNEE(S):

Bayer Aktiengesellschaft, Leverkusen, Germany, Federal

Republic of (non-U.S. corporation)

KIND DATE NUMBER 20010515 В1 PATENT INFORMATION: US 6232328 19970908 US 1997-925372 APPLICATION INFO.:

RELATED APPLN. INFO .:

Continuation of Ser. No. US 1995-440428, filed on 12

May 1995, now abandoned

NUMBER DE 1994-4417742 19940520 PRIORITY INFORMATION:

DOCUMENT TYPE:

Utility

Granted FILE SEGMENT: PRIMARY EXAMINER:

Robinson, Allen J.

LEGAL REPRESENTATIVE:

Norris McLaughlin & Marcus

NUMBER OF CLAIMS: EXEMPLARY CLAIM:

1

LINE COUNT:

1253

CAS INDEXING IS AVAILABLE FOR THIS PATENT.

Use of agonists and antagonists of the nicotinergic acetylcholine receptors of insects for the non-systemic control of parasitic insects, such as fleas, lice and flies, on humans and on

animals.

CAS INDEXING IS AVAILABLE FOR THIS PATENT.

IT 101336-64-5

(nonsystemic ectoparasiticide)

RN 101336-64-5 USPATFULL

Pyrimidine, 1-[(6-chloro-3-pyridinyl)methyl]hexahydro-2-(nitromethylene)-CN (CA INDEX NAME) (9CI)

=> fil reg FILE 'REGISTRY! ENTERED AT 10:31:26 ON 26 MAR 2003 USE IS SUBJECT TO THE TERMS OF YOUR STN CUSTOMER AGREEMENT. PLEASE SEE "HELP USAGETERMS" FOR DETAILS. COPYRIGHT (C) 2003 American Chemical Society (ACS)

Property values tagged with IC are from the ZIC/VINITI data file provided by InfoChem.

STRUCTURE FILE UPDATES: 25 MAR 2003 HIGHEST RN 500688-79-9 DICTIONARY FILE UPDATES: 25 MAR 2003 HIGHEST RN 500688-79-9

TSCA INFORMATION NOW CURRENT THROUGH MAY 20, 2002

Please note that search-term pricing does apply when conducting SmartSELECT searches.

Crossover limits have been increased. See HELP CROSSOVER for details.

Experimental and calculated property data are now available. See HELP PROPERTIES for more information. See STNote 27, Searching Properties in the CAS Registry File, for complete details: http://www.cas.org/ONLINE/STN/STNOTES/stnotes27.pdf

=> d stat que 18 L1 STR X - Hy - G1 - N - C = G2 - G31 2 3 4 5 6 7

same full file search as before

VAR G2=CH/N
VAR G3=NO2/CN
NODE ATTRIBUTES:
NSPEC IS R AT 4
NSPEC IS R AT 5
DEFAULT MLEVEL IS ATOM
GGCAT IS MCY UNS AT 2
DEFAULT ECLEVEL IS LIMITED
ECOUNT IS M1 N AT 2

GRAPH ATTRIBUTES:

T.4

REP G1 = (1-2) CH2

RING(S) ARE ISOLATED OR EMBEDDED

NUMBER OF NODES IS 7

STEREO ATTRIBUTES: NONE

L3 1296 SEA FILE=REGISTRY SSS FUL L1

925534 SEA FILE=REGISTRY ABB=ON 46.156.30/RID

L7 467491 SEA FILE=REGISTRY ABB=ON 16.299/RID / 1276 SEA FILE=REGISTRY ABB=ON L3 AND (L4 OR L7

1276 SEA FILE=REGISTRY ABB=ON L3 AND (L4 OR L7):

O or CX

=> fil hcapl; d que nos 136; s 136 not 122

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FILE COVERS 1907 - 26 Mar 2003 VOL 138 ISS. 13 FILE LAST UPDATED: 25 Mar 2003 (20030325/ED)

This file contains CAS Registry Numbers for easy and accurate substance identification.

```
L1
                STR
L3
           1296 SEA FILE=REGISTRY SSS FUL L1
         925534 SEA FILE=REGISTRY ABB=ON
                                           46.156.30/RID
L7
         467491 SEA FILE=REGISTRY ABB=ON
                                          16.299/RID
           1276 SEA FILE=REGISTRY ABB=ON L3 AND (L4 OR L7)
rs
            377 SEA FILE=HCAPLUS ABB=ON SIPHONAPTERA+NT/CT
L15
             17 SEA FILE=HCAPLUS ABB=ON
L16
                                         ANOPLURA?
           3183 SEA FILE=HCAPLUS ABB=ON
                                         FLEA# OR LICE OR LOUSE
L17
           3258 SEA FILE=HCAPLUS ABB=ON
                                         PARASITICIDES+OLD/CT
L20
           1193 SEA FILE=HCAPLUS ABB=ON
                                         ECTOPARASIT? OR PARASIT? (L) ECTO/OBI
L21
           1367 SEA FILE=HCAPLUS ABB=ON
L32
                                         Т8
             56 SEA FILE=HCAPLUS ABB=ON
                                         L32 AND ((L15 OR L16 OR L17) OR (L20
L33
                OR L21))
L34
         115984 SEA FILE=HCAPLUS ABB=ON
                                          DERMAL? OR TOPICAL? OR (SPOT OR POUR)
                OR SPOTON OR SHAMPOO?
L35
            443 SEA FILE=HCAPLUS ABB=ON
                                         NONSYSTEM?
L36
             15 SEA FILE=HCAPLUS ABB=ON L33 AND (L34 OR L35)
```

```
L61 14 L36 NOT (L22) previously printed
```

=> fil uspatf; d que nos 139; s 139 not 131

FILE 'USPATFULL' ENTERED AT 10:31:28 ON 26 MAR 2003 CA INDEXING COPYRIGHT (C) 2003 AMERICAN CHEMICAL SOCIETY (ACS)

USPTO MANUAL OF CLASSIFICATIONS THESAURUS ISSUE DATE: Dec 2002

FILE COVERS 1971 TO PATENT PUBLICATION DATE: 25 Mar 2003 (20030325/PD)
FILE LAST UPDATED: 25 Mar 2003 (20030325/ED)
HIGHEST GRANTED PATENT NUMBER: US6539548
HIGHEST APPLICATION PUBLICATION NUMBER: US2003056270
CA INDEXING IS CURRENT THROUGH 25 Mar 2003 (20030325/UPCA)
ISSUE CLASS FIELDS (/INCL) CURRENT THROUGH: 25 Mar 2003 (20030325/PD)
REVISED CLASS FIELDS (/NCL) LAST RELOADED: Dec 2002

```
>>>
    USPAT2 is now available. USPATFULL contains full text of the
                                                                       <<<
>>>
    original, i.e., the earliest published granted patents or
                                                                       <<<
    applications. USPAT2 contains full text of the latest US
>>>
                                                                       <<<
    publications, starting in 2001, for the inventions covered in
>>>
                                                                       <<<
    USPATFULL. A USPATFULL record contains not only the original
>>>
                                                                       <<<
    published document but also a list of any subsequent
>>>
                                                                       <<<
>>>
    publications. The publication number, patent kind code, and
                                                                       <<<
>>>
    publication date for all the US publications for an invention
                                                                       <<<
>>> are displayed in the PI (Patent Information) field of USPATFULL
                                                                       <<<
>>> records and may be searched in standard search fields, e.g., /PN, <<<
```

09/720646

```
<<<
>>> /PK, etc.
>>> USPATFULL and USPAT2 can be accessed and searched together
                                                                       <<<
                                                                       <<<
>>> through the new cluster USPATALL. Type FILE USPATALL to
                                                                       <<<
>>>
     enter this cluster.
                                                                       <<<
>>>
>>> Use USPATALL when searching terms such as patent assignees,
                                                                       <<<
>>> classifications, or claims, that may potentially change from
                                                                       <<<
                                                                       <<<
>>> the earliest to the latest publication.
```

This file contains CAS Registry Numbers for easy and accurate substance identification.

```
STR
L1
           1296 SEA FILE=REGISTRY SSS FUL L1
L3
         925534 SEA FILE=REGISTRY ABB=ON 46.156.30/RID
T.4
         467491 SEA FILE=REGISTRY ABB=ON 16.299/RID
L7
           1276 SEA FILE=REGISTRY ABB=ON L3 AND (L4 OR L7)
rs
            580 SEA FILE=USPATFULL ABB=ON. (FLEA# OR LICE OR LOUSE)/IT,TI,AB,CL
L25
           1185 SEA FILE=USPATFULL ABB=ON (PARASITICID? OR PARACITICID?)/IT,TI
L26
                , AB, CLM
                                            (ECTOPARASIT? OR PARASIT? (L) ECTO) / IT
            498 SEA FILE=USPATFULL ABB=ON
L27
                ,TI,AB,CLM
                                           ANOPLURA?/IT,TI,AB,CLM
              8 SEA FILE=USPATFULL ABB=ON
L28
                                            SIPHONAPTERA?/IT, TI, AB, CLM
           . 84 SEA FILE=USPATFULL ABB=ON
L29
                                            CTENOCEPHALIDE?/IT, TI, AB, CLM
             52 SEA FILE=USPATFULL ABB=ON
L30
            222 SEA FILE=USPATFULL ABB=ON
                                           L8
L37
          37257 SEA FILE=USPATFULL ABB=ON (NONSYSTEM? OR NON SYSTEM? OR
L38
                DERMAL? OR TOPICAL? OR (SPOT OR POUR) OR SPOTON OR SHAMPOO?)/IT
                 ,TI,AB,CLM
             13 SEA FILE=USPATFULL ABB=ON L37 AND (L25 OR L26 OR L27 OR L28
L39
                OR L29 OR L30) AND L38
```

```
L62 6 L39 NOT (131) previously
```

=> fil biosis; d que nos 146

FILE 'BIOSIS' ENTERED AT 10:31:29 ON 26 MAR 2003 COPYRIGHT (C) 2003 BIOLOGICAL ABSTRACTS INC. (R)

FILE COVERS 1969 TO DATE. CAS REGISTRY NUMBERS AND CHEMICAL NAMES (CNs) PRESENT FROM JANUARY 1969 TO DATE.

RECORDS LAST ADDED: 19 March 2003 (20030319/ED)

```
STR
L1
           1296 SEA FILE=REGISTRY SSS FUL L1
L3
         925534 SEA FILE=REGISTRY ABB=ON 46.156.30/RID
L4
         467491 SEA FILE=REGISTRY ABB=ON 16.299/RID
L7
           1276 SEA FILE=REGISTRY ABB=ON L3 AND (L4 OR L7)
rs
           1146 SEA FILE=BIOSIS ABB=ON L8
L40
           4332 SEA FILE=BIOSIS ABB=ON (ECTOPARASIT? OR PARASIT?(2A)ECTO)
L41
           4957 SEA FILE=BIOSIS ABB=ON ANOPLURA? OR SIPHONAPTERA?
L42
            510 SEA FILE=BIOSIS ABB=ON CTENOCEPHALIDE?
L43
           6467 SEA FILE=BIOSIS ABB=ON (FLEA# OR LICE OR LOUSE)
L44
                                       (NONSYSTEM? OR NON SYSTEM? OR DERMAL?
          81132 SEA FILE=BIOSIS ABB=ON
L45
```

ì

OR TOPICAL? OR (SPOT OR POUR) OR SPOTON OR SHAMPOO?)

L46

20 SEA FILE=BIOSIS ABB=ON L40 AND (L41 OR L42 OR L43 OR L44) AND
L45

=> fil vetu; d que nos 148

FILE 'VETU'. ENTERED AT 10:31:30 ON 26 MAR 2003 COPYRIGHT (C) 2003 THOMSON DERWENT

FILE LAST UPDATED: 02 JAN 2002 <20020102/UP>
FILE COVERS 1983-2001

L1 STR
L3 1296 SEA FILE=REGISTRY SSS FUL L1
L4 925534 SEA FILE=REGISTRY ABB=ON 46.156.30/RID
L7 467491 SEA FILE=REGISTRY ABB=ON 16.299/RID
L8 1276 SEA FILE=REGISTRY ABB=ON L3 AND (L4 OR L7)
L48 8 SEA FILE=VETU ABB=ON L8

=> fil agricola; d que nos 157

FILE 'AGRICOLA' ENTERED AT 10:31:31 ON 26 MAR 2003

FILE COVERS 1970 TO 19 Feb 2003 (20030219/ED)

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This file contains CAS Registry Numbers for easy and accurate substance identification.

```
L1
                STR
L3
           1296 SEA FILE=REGISTRY SSS FUL L1
L4
         925534 SEA FILE=REGISTRY ABB=ON 46.156.30/RID
L7
         467491 SEA FILE=REGISTRY ABB=ON
                                          16.299/RID
           1276 SEA FILE=REGISTRY ABB=ON
                                          L3 AND (L4 OR L7)
1.8
L51
            416 SEA FILE=AGRICOLA ABB=ON L8
           1555 SEA FILE=AGRICOLA ABB=ON
                                          (ECTOPARASIT? OR PARASIT? (2A) ECTO)
L52
                                          ANOPLURA? OR SIPHONAPTERA?
L53
           1426 SEA FILE=AGRICOLA ABB=ON
L54
            372 SEA FILE=AGRICOLA ABB=ON
                                          CTENOCEPHALIDE?
L55
           3467 SEA FILE=AGRICOLA ABB=ON
                                           (FLEA# OR LICE OR LOUSE)
L56
          15582 SEA FILE=AGRICOLA ABB=ON
                                          (NONSYSTEM? OR NON SYSTEM? OR
                DERMAL? OR TOPICAL? OR (SPOT OR POUR) OR SPOTON OR SHAMPOO?)
L57
             21 SEA FILE-AGRICOLA ABB-ON L51 AND (L52 OR L53 OR L54 OR L55)
                AND L56
```

=> dup rem 161,162,148,157,146

FILE 'HCAPLUS' ENTERED AT 10:33:02 ON 26 MAR 2003

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FILE 'USPATFULL' ENTERED AT 10:33:02 ON 26 MAR 2003
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FILE 'AGRICOLA' ENTERED AT 10:33:02 ON 26 MAR 2003

FILE 'BIOSIS' ENTERED AT 10:33:02 ON 26 MAR 2003 COPYRIGHT (C) 2003 BIOLOGICAL ABSTRACTS INC.(R)

PROCESSING COMPLETED FOR L61
PROCESSING COMPLETED FOR L48
PROCESSING COMPLETED FOR L57
PROCESSING COMPLETED FOR L46

L64 48 DUP REM L61 L62 L48 L57 L46 (21 DUPLICATES REMOVED)

ANSWERS '1-14' FROM FILE HCAPLUS ANSWERS '15-20' FROM FILE USPATFULL ANSWERS '21-26' FROM FILE VETU ANSWERS '27-41' FROM FILE AGRICOLA ANSWERS '42-48' FROM FILE BIOSIS

=> d ibib abs hitstr 1-20; d iall 21-48

L64 ANSWER 1 OF 48 HCAPLUS COPYRIGHT 2003 ACS DUPLICATE 1

ACCESSION NUMBER: 2002:111823 HCAPLUS

DOCUMENT NUMBER: 136:290510

TITLE: Laboratory evaluation of fipronil and imidacloprid

topical insecticides for control of the plague

vector Oropsylla montana (Siphonaptera:

Ceratophyllidae) on California ground squirrels

(Rodentia: Sciuridae)

AUTHOR(S): Metzger, Marco E.; Rust, Michael K.

CORPORATE SOURCE: Department of Entomology, University of California,

Riverside, CA, 92521-0314, USA

SOURCE: Journal of Medical Entomology (2002), 39(1), 152-161

CODEN: JMENA6; ISSN: 0022-2585 Entomological Society of America

DOCUMENT TYPE: Journal LANGUAGE: English

PUBLISHER:

AB Two insecticides, fipronil and imidacloprid, were evaluated for efficacy and longevity against Oropsylla montana (Baker), the most important vector of plague in California. Wild-caught California ground squirrels, Spermophilus beecheyi (Richardson), were individually housed in the lab. to serve as natural hosts to O. montana and for on-animal insecticide trials. Several concns. of tech. grade fipronil and imidacloprid in acetone were applied to samples of clean rodent bedding to det. residual activity and longevity against fleas. Immature and adult cat fleas, Ctenocephalides felis (Bouche), were used as representative fleas for periodic assays in place of less fecund O. montana. Toxicity of treated bedding did not decrease significantly for 1 yr at all applied concns. Fipronil provided 100% kill for at least 1 yr at .gtoreq. 100 ppm, whereas imidacloprid required 10,000 ppm for similar performance. Lab. squirrels were treated with topical formulations of fipronil (Frontline Top Spot) and imidacloprid (Advantage Flea Adulticide) at a dosage rate of 15 mg/kg and evaluated for residual activity every 2 wk against adult O. montana. Residual activity was detd. by percent recovery of O. montana adults released on treated and untreated animals after 48 h. Frontline provided 100% kill of adult fleas for at least 10 wk, and up to 26 wk on one animal. Advantage failed to provide 100% kill of adult fleas at 2 wk, with complete loss of efficacy by week 6. Concurrent assays with bedding samples from squirrel nest boxes showed negligible toxicity transfer from treated animals to nest bedding.

IT 138261-41-3, Imidacloprid